

# Foreword

## How Forecasts Are Made

Most of the annual streamflow in the Western United States originates as snowfall. This snowfall accumulates high in the mountains during winter and early spring. As the snowpack accumulates, hydrologists estimate the runoff that will occur when it melts. Predictions are based on careful measurements of snow water equivalent at selected index points. Precipitation, temperature, soil moisture and antecedent streamflow data are viewed in conjunction with snowpack data to prepare runoff forecasts. This report presents a comprehensive picture of water supply outlook conditions for areas dependent upon surface runoff. It includes selected streamflow forecasts, summarized snowpack and precipitation data, reservoir storage data and narratives describing current conditions.

Streamflow forecasts are cooperatively generated by Soil Conservation Service and National Weather Service hydrologists. Forecasts become more accurate as more data affecting runoff becomes known. For this reason, forecasts are issued that reflect three future precipitation conditions — Below Normal, Average, and Above Normal. These forecasts are termed reasonable minimum, most probable, and reasonable maximum. Actual streamflow can be expected to fall between the lower and upper forecast values eight out of ten years.

Snowpack data are obtained by using a combination of manual and automated measurement methods. Manual readings of snow depth and water equivalent are taken at locations called snow courses on a monthly or semi-monthly schedule during the winter. In addition, snow water equivalent, precipitation, temperature, and other parameters are monitored on a daily basis and transmitted via radio telemetry to central data collection facilities. Both monthly and daily data are used to project snowmelt runoff.

## For More Information

Copies of Monthly Water Supply Outlook Reports and other reports may be obtained from the states listed below. Because of the limited space, snow survey measurements are not published in monthly reports. An annual snow survey data summary is published by the Soil Conservation Service for each of the western states. Historical snow survey data may be obtained at those same offices.

STATE	ADDRESS
Alaska	201 East 9th Ave., Suite 300, Anchorage, AK 99501-3687
Arizona	201 East Indianola, Suite 200, Phoenix, AZ 85012
Colorado	2490 West 26th Ave., Denver, CO 80211
New Mexico	517 Gold Ave. S.W., Room 3301, Albuquerque, NM 97102
Idaho	304 North 8th Street, Room 345, Boise, ID 83702
Montana	10 East Babcock, Room 443, Federal Building, Bozeman, MT 59715
Nevada	1201 Terminal Way, Room 219, Reno, NV 89502
Oregon	1220 Southwest 3rd Ave., Room 1640, Portland, OR 97208
Utah	4402 Federal Building, 125 South State Street, Salt Lake City, UT 84147
Washington	360 U.S. Court House, Spokane, WA 99201
Wyoming	Federal Building, 100 East "B" Street, Casper, WY 82601

In addition to state reports, a Water Supply Outlook for the Western United States is published by the Soil Conservation Service and National Weather Service monthly, January through May. Reports may be obtained from the Soil Conservation Service, West National Technical Center, 511 Northwest Broadway, Room 547, Portland, OR 97209.

Published by other agencies:

Water Supply Outlook Reports prepared by other agencies include: California — Snow Survey Branch, California Department of Water Resources, P.O. Box 388, Sacramento, CA 95802; British Columbia — The Ministry of Environment, Water Investigations Branch, Parliament Buildings, Victoria, British Columbia, V8V 1X5; Yukon Territory — Department of Indian and Northern Affairs, Northern Operations Branch, 200 Range Road, Whitehorse, Yukon Territory, Y1A 3V1; Alberta, Environment Technical Services Division, 9820 106th St., Edmonton, Alberta T5K 2J6.

# Utah Water Supply Outlook

and

Federal – State – Private  
Cooperative Snow Surveys

## **Issued by**

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## **In cooperation with**

Utah State Department of Natural Resources	
Robert L. Morgan	D. Larry Anderson
State Engineer	Director
Division of Water Rights	Division of Water Resources

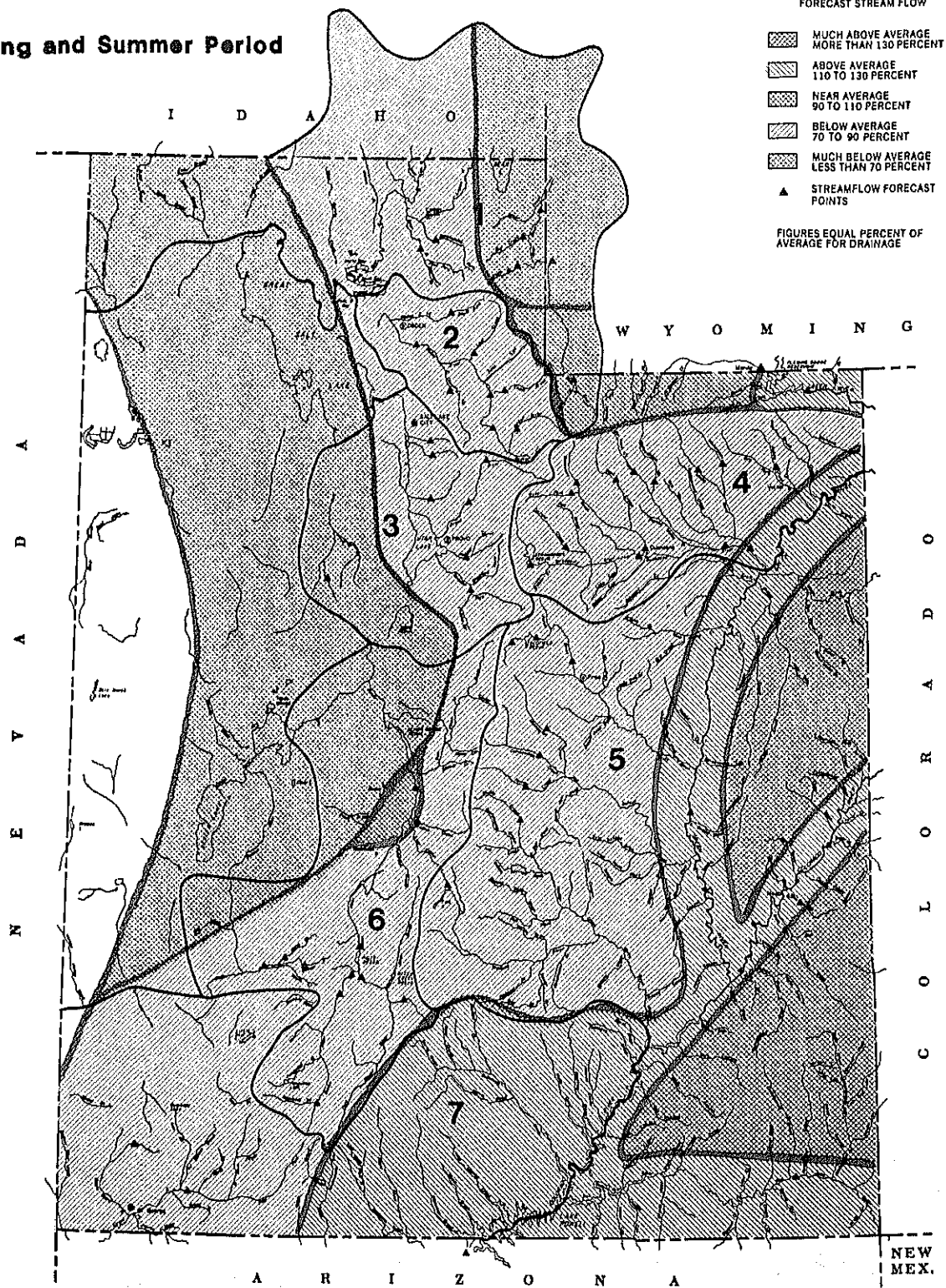
## **Prepared by**

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**Programs and assistance of the United States Department of Agriculture are available without regard to race, creed, color, sex, age, or national origin.**

# Streamflow Prospects for Utah

Spring and Summer Period



## GENERAL OUTLOOK

### SUMMARY:

Snow surveys conducted the last week of December indicate the snowpack is only about half of the January 1 average. Streamflow forecasts are generally below average but, with only 40% of maximum snowpack accumulation normally on the ground by January 1, there is still adequate time to recover.

### SNOWPACK:

January 1 snowpack across Utah is much below normal. The Uintas are nearer to normal than the rest of the state at 63% of the January 1 average. Percentages range downward to 53% in Southeastern Utah to 43% in Southwestern Utah.

### PRECIPITATION:

Precipitation at mountain stations for the October through December period was, generally, much below normal.

### RESERVOIRS:

Stored water in the 26 irrigation reservoirs in our sample is at 85% of capacity and 135% of average for this time of year. Normally these reservoirs are only storing 63% of capacity by the end of December. The only dark spot in an otherwise bright reservoir storage picture is in extreme Southwestern Utah where the 4 reservoirs sampled only contain about 32% of capacity.

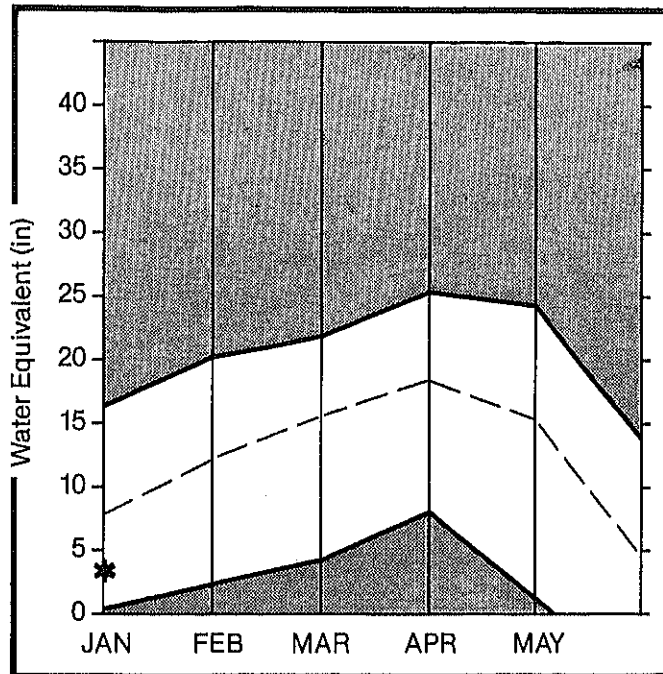
### STREAMFLOW:

Streamflow forecasts are generally for below average spring and summer flows as of January 1 assuming average precipitation from now through the forecast period. Forecasts range from 55% for the Bear near Harer to 182% for the Sigurd to Gunnison reach of the Sevier.





*Forecasts prepared for this bulletin represent cooperative efforts of the Soil Conservation Service and the National Weather Service in an effort to provide the best possible service to water users and managers.*

# Bear River Basin

## Mountain snowpack\* (inches)



\*Based on selected stations

Maximum  Average   
 Minimum  Current 

## WATER SUPPLY OUTLOOK:

Snowpack on the Bear River watershed as of January 1 was 45% of average. Logan River snowpack was only 37% of the January 1 average. Streamflow forecasts are for less than average flows assuming average precipitation from now through the forecast period. Forecast range from 55% for the Bear near Harer to 91% for the Bear near UT-WY stateline. Reservoir storage is currently 75% of usable capacity and 109% of average for this time of year.

For more information contact your local Soil  
 Conservation Service office:  
 Tremonton Field Office 801-257-5403  
 Logan Field Office 801-753-5616

# BEAR RIVER BASIN

## STREAMFLOW FORECASTS

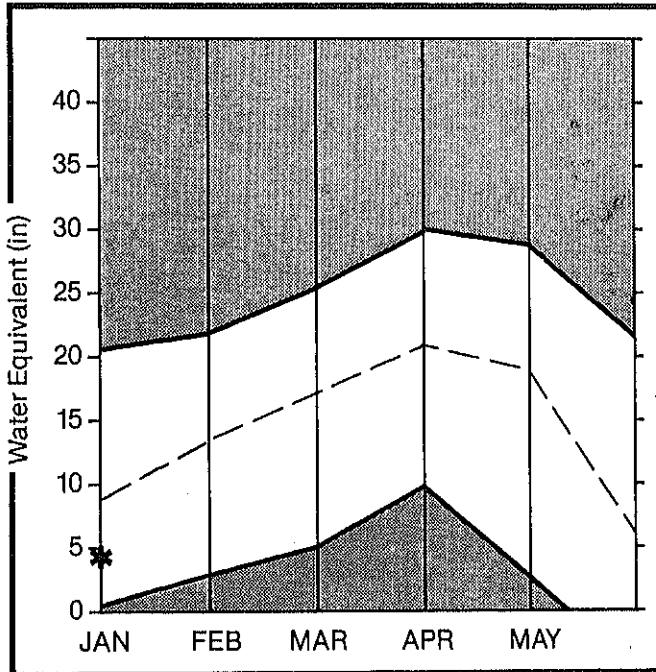
FORECAST POINT	FORECAST PERIOD	25 YR. AVG. (1000AF)	MOST PROBABLE (1000AF)	MOST PROBABLE (% AVG.)	REAS. MAX. (1000AF)	REAS. MAX. (% AVG.)	REAS. MIN. (1000AF)	REAS. MIN. (% AVG.)
BEAR RIVER near UT-WY Stateline	APR-JUL	116.0	105.0	91	140.0	121	67.0	58
BEAR RIVER near Woodruff	APR-JUL	144.0	104.0	72	182.0	126	22.0	15
WOODRUFF CREEK near Woodruff	APR-JUL	17.0	12.0	69	17.0	98	7.0	40
WOODRUFF CREEK near Randolph	APR-JUL	5.0	3.7	70	7.0	132	1.0	19
BEAR RIVER near Randolph	APR-JUL	126.0	75.0	60	159.0	126	15.0	12
MAS FORK near Stateline	APR-SEP	37.0	25.0	68	35.0	95	15.0	41
MAS FORK near Border	APR-SEP	122.0	90.0	74	124.0	102	56.0	46
BEAR RIVER near Harer	APR-SEP	326.0	180.0	55	314.0	96	70.0	21
BEAR RIVER near Logan	APR-JUL	122.0	95.0	78	132.0	108	63.0	52
BLACKSMITH FORK near Hyrum	APR-JUL	57.0	37.0	65	66.0	116	11.0	19
UPPER BEAR RIVER near Paradise	APR-JUN	42.0	32.0	76	56.0	133	8.0	19
BEAR RIVER near Preston	APR-JUL	46.8	33.0	70	60.0	128	6.0	13

RESERVOIR STORAGE (1000AF)					WATERSHED SNOWPACK ANALYSIS		
RESERVOIR	USEABLE CAPACITY	** USEABLE STORAGE ** THIS YEAR	LAST YEAR	AVG.	WATERSHED	NO. COURSES AVG'D	THIS YEAR AS % OF LAST YR. AVERAGE
BEAR LAKE	1421.0	1048.8	1073.7	987.6	BEAR RIVER, UPPER IN UTAH	6	48 62
WYOMING	15.3	8.5	10.3	10.0	BEAR RIVER, LOWER IN UTAH	8	31 38
CUPINE	11.3	10.0	6.2	2.8	BEAR RIVER DRAINAGE IN UT	13	36 45
WOODRUFF NARROWS	55.8	50.7	---	---	BEAR RIVER, UPPER (above	6	48 62
WOODRUFF CREEK	3.5	3.0	---	---	BEAR RIVER, LOWER (below	11	33 41
					BEAR RIVER DRAINAGE	15	36 45
					LOGAN RIVER	5	32 37
					RAFT RIVER	0	0 0
					BEAR RIVER BASIN	18	37 47





Reas. max. and reas. min. forecasts are for 5% and 95% exceedance levels and also (2) below.  
Corrected for upstream diversions or changes in reservoir storage.  
Average is computed for the 1961-85 base period.

# Weber & Ogden Watersheds

Mountain snowpack\* (inches)



\*Based on selected stations

Maximum		Average	
Minimum		Current	

## WATER SUPPLY OUTLOOK:

Snowpack on the Weber River drainage had only 52% of the normal water content on January 1. The Ogden was slightly lower at 44%. Streamflow forecasts are for below normal flows. Forecasts range from 66% of average for inflow to Pineview Reservoir to 85% on Chalk Creek near Coalville. Stored water in the reservoirs of the Weber Basin is currently 80% of usable capacity and 140% of average for this time of year.

For more information contact your local Soil  
Conservation Service office:  
Layton Sub Office 801-544-9144



# WEBER & OGDEN WATERSHEDS in Utah

## STREAMFLOW FORECASTS

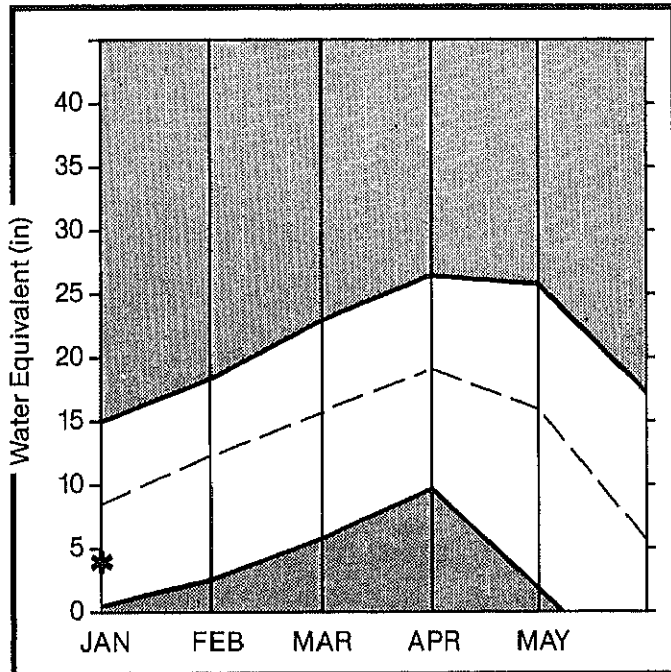
FORECAST POINT	FORECAST PERIOD	25 YR. AVG. (1000AF)	MOST PROBABLE (1000AF)	MOST PROBABLE (% AVG.)	REAS. MAX. (1000AF)	REAS. MAX. (% AVG.)	REAS. MIN. (1000AF)	REAS. MIN. (% AVG.)
WEBER RIVER near Oakley	APR-JUN	107.0	85.0	79	125.0	117	50.0	47
ROCKPORT RESERVOIR inflow	APR-JUN	120.0	87.0	73	148.0	123	32.0	27
CHALK CREEK near Coalville	APR-JUN	41.0	35.0	85	56.0	137	20.0	49
WEBER RIVER near Coalville	APR-JUN	127.0	90.0	71	150.0	118	42.0	33
LOST CREEK near Croyden	APR-JUN	15.6	11.5	74	21.0	135	5.0	32
EAST CANYON CREEK near Morgan	APR-JUN	29.0	23.0	79	39.0	134	9.0	31
HARDSCRABBLE CREEK near Porterville	APR-JUN	18.4	13.5	73	27.0	147	5.0	27
SOUTH FORK OGDEN RIVER near Huntsvil	APR-JUN	58.0	42.0	72	62.0	107	19.0	33
WHEELER CREEK near Huntsville	APR-JUL	6.5	5.2	80	7.0	108	3.0	46
PINEVIEW RESERVOIR inflow	APR-JUN	122.0	80.0	66	115.0	94	36.0	30
ECHO RESERVOIR inflow	APR-JUN	163.0	128.0	79	205.0	126	66.0	40
WEBER RIVER at Gateway	APR-JUN	328.0	235.0	72	366.0	112	110.0	34
FARMINGTON CREEK near Farmington	APR-JUL	8.2	6.2	76	12.0	146	3.0	37

RESERVOIR STORAGE (1000AF)					WATERSHED SNOWPACK ANALYSIS		
RESERVOIR	USEABLE CAPACITY	** USEABLE STORAGE THIS YEAR	LAST YEAR	AVG.	WATERSHED	NO. COURSES AVG'D	THIS YEAR AS % OF LAST YR. AVERAGE
CAUSEY	6.9	4.5	1.9	2.1	OGDEN RIVER	4	33 44
EAST CANYON	48.1	39.7	41.0	33.3	WEBER RIVER	13	40 52
ECHO	73.9	62.5	57.5	41.4	WEBER & OGDEN WATERSHEDS	17	38 49
LOST CREEK	20.0	16.2	15.3	12.7			
PINEVIEW	110.1	69.3	68.9	50.0			
ROCKPORT	60.9	47.4	38.5	34.1			
HILLARD BAY	165.5	150.9	135.1	104.9			

1 - Reas. max. and reas. min. forecasts are for 5% and 95% exceedance levels and also (2) below.  
2 - Corrected for upstream diversions or changes in reservoir storage.  
The average is computed for the 1961-85 base period.

# Utah Lake, Jordan River & Tooele Valley

Mountain snowpack\* (Inches)



\*Based on selected stations

Maximum		Average	
Minimum		Current	

## WATER SUPPLY OUTLOOK:

January 1 snowpack is much below average. The Utah Lake watershed has only 33% of normal and the Jordan River tributaries directly east of the Salt Lake Valley have 57% of normal January 1 water content. Tooele Valley watersheds are 60% of average. Streamflow forecasts range from 58% to 108% of average. Reservoir storage is currently only slightly less than last year at this time. Stored usable water is currently 98% of capacity and 146% of average.

For more information contact your local Soil  
Conservation Service office:  
Midvale Field Office 801-524-4373  
Provo Field Office 801-377-5580

# UTAH LAKE, JORDAN RIVER & TOOELE VALLEY

## STREAMFLOW FORECASTS

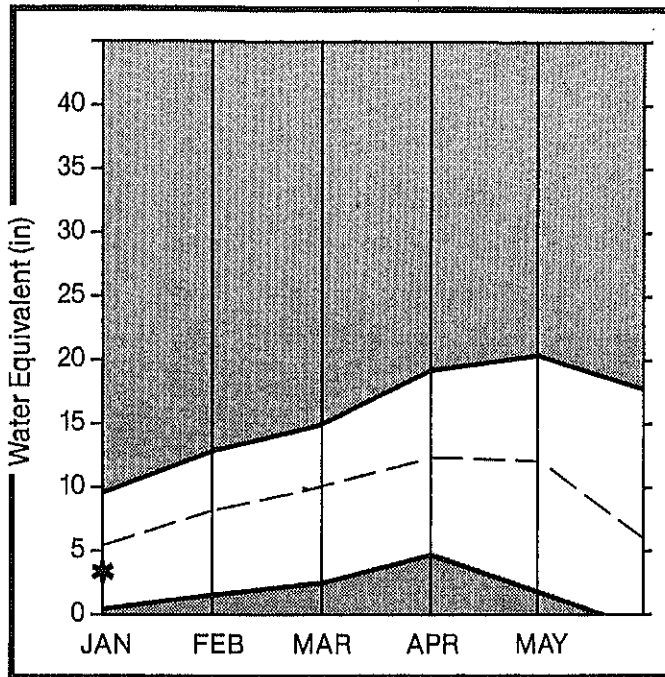
FORECAST POINT	FORECAST PERIOD	25 YR. AVG. (1000AF)	MOST PROBABLE (1000AF)	MOST PROBABLE (% AVG.)	REAS. MAX. (1000AF)	REAS. MAX. (% AVG.)	REAS. MIN. (1000AF)	REAS. MIN. (% AVG.)
PROVO near Hailstone	APR-JUL	113.0	92.0	81	139.0	123	48.0	42
PROVO below Deer Creek Dam	APR-JUL	133.0	97.0	73	152.0	114	34.0	26
AMERICAN FORK near American Fk.	APR-JUL	34.0	28.0	82	37.0	109	21.0	62
HOBBLE CREEK near Springville	APR-JUL	18.7	13.5	72				
STRAWBERRY RESERVOIR inflow	APR-JUL	60.0	58.0	97	75.0	125	36.0	60
PAYSON CREEK near Payson	APR-JUL	6.2	5.1	82				
UTAH LAKE inflow	APR-JUL	295.0	320.0	108	470.0	159	173.0	59
LITTLE COTTONWOOD CRK near SLC	APR-JUL	41.0	33.0	80	41.0	100	22.0	54
BIG COTTONWOOD CRK near SLC	APR-JUL	39.0	38.0	97	44.0	113	31.0	79
PARLEY'S CREEK near SLC	APR-JUL	17.0	13.7	81	21.0	124	8.0	47
MILL CREEK near SLC	APR-JUL	6.9	7.2	104	10.0	145	3.0	43
EMIGRATION CREEK near SLC	APR-JUL	4.6	3.5	76				
CITY CREEK near SLC	APR-JUL	9.0	6.6	73	9.0	100	4.0	44
SETTLEMENT CREEK near Tooele	APR-JUL	2.3	1.8	78	3.0	130	0.5	21
SOUTH WILLOW CREEK near Grantsville	APR-JUL	3.0	1.9	63	4.0	133	0.7	23
VERNON CREEK near Vernon	APR-JUN	1.2	0.7	58	1.5	122	0.2	17

RESERVOIR STORAGE		(1000AF)			WATERSHED SNOWPACK ANALYSIS			
RESERVOIR	USEABLE CAPACITY <sup>1</sup>	THIS YEAR	LAST YEAR	Avg.	WATERSHED	NO. COURSES AVG'D	THIS YEAR AS % OF LAST YR. AVERAGE	
DEER CREEK	149.7	113.1	128.0	93.5	PROVO RIVER & UTAH LAKE	10	26	33
GRANTSVILLE	3.3	2.2	---	---	PROVO RIVER	5	26	36
SETTLEMENT CREEK	1.0	0.8	0.8	0.6	JORDAN RIVER & GREAT SALT	5	52	57
STRAWBERRY-ENLARGED	951.4	529.1	506.0	---	TOOELE VALLEY WATERSHEDS	4	56	60
UTAH LAKE	883.9	903.0	900.0	601.6	UTAH LAKE, JORDAN RIVER &	19	39	46
VERNON CREEK	0.6	0.3	0.2	0.4				

1 - Reas. max. and reas. min. forecasts are for 5% and 95% exceedance levels and also (2) below.  
 2 - Corrected for upstream diversions or changes in reservoir storage.  
 The average is computed for the 1961-85 base period.

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Mountain snowpack\* (inches)



\*Based on selected stations

Maximum		Average	
Minimum		Current	

## 

Snowpack on the Uintas is quite variable. High elevation snow courses have near normal snowpack while lower elevation courses are nearly bare. Snow Water content is only 25% of average on the Strawberry River but Sheep Creek has 105% of average for January 1. Streamflow forecasts range from 82% to 113% of average. Reservoir Storage is very good for this time of year. Stored water is currently 89% of capacity and 152% of average for January 1.

For more information contact your local Soil Conservation Service office:  
Roosevelt Field Office 801-722-4621

# UINTAH BASIN & DAGGET SCD'S

## STREAMFLOW FORECASTS

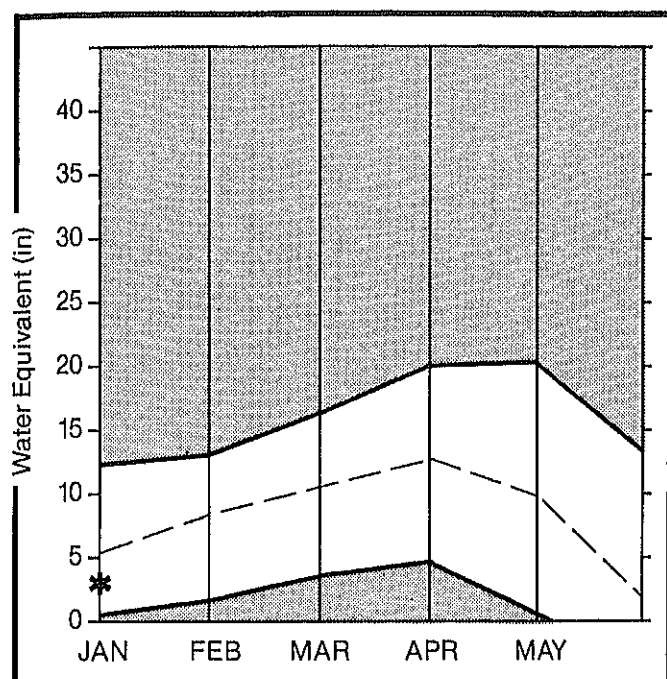
FORECAST POINT	FORECAST PERIOD	25 YR. AVG. (1000AF)	MOST PROBABLE (1000AF)	MOST PROBABLE (% AVG.)	REAS. MAX. (1000AF)	REAS. MAX. (% AVG.)	REAS. MIN. (1000AF)	REAS. MIN. (% AVG.)
DUCHESNE RIVER near Tabiona	APR-JUL	105.0	86.0	82	113.0	108	53.0	50
DUCHESNE RIVER near Duchesne	APR-JUL	189.0	155.0	82	214.0	113	98.0	52
STRAWBERRY RIVER at Duchesne	APR-JUL	69.0	66.0	96	87.0	126	45.0	65
ROCK CREEK near Mountain Home	APR-JUL	95.0	80.0	84	112.0	118	54.0	57
CURRENT CREEK near Fruitland	APR-JUL	20.0	18.0	90	24.0	120	12.0	60
LAKEFORK RIVER near Mountain Home	APR-JUL	70.0	65.0	93	89.0	127	45.0	64
YELLOWSTONE RIVER near Altonah	APR-JUL	66.0	61.0	92	89.0	135	33.0	50
DUCHESNE near Myton	APR-JUL	223.0	220.0	99	310.0	139	95.0	43
WHITE ROCKS RIVER near Whiterocks	APR-JUL	60.0	51.0	85	76.0	127	26.0	43
UINTAH RIVER near Neola	APR-JUL	86.0	76.0	88	112.0	130	40.0	47
DUCHESNE near Randlett	APR-JUL	257.0	290.0	113	480.0	187	100.0	39
WEST FORK DUCHESNE RIVER near Hanna	APR-JUL	26.0	24.0	92	31.0	119	15.0	58
HENRY'S FORK near Manila	APR-SEP	51.0	50.0	98	73.0	143	32.0	63
BLACK'S FORK near Millburne	APR-JUL	90.0	84.0	93	121.0	134	53.0	59
FLAMING GORGE RESERVOIR inflow	APR-JUL	1267.0	1400.0	112	1840.0	145	1010.0	80
ASHLEY CREEK near Vernal	APR-JUL	52.0	50.0	96	68.0	131	36.0	69

RESERVOIR STORAGE (1000AF)					WATERSHED SNOWPACK ANALYSIS		
RESERVOIR	USEABLE CAPACITY <sup>1</sup>	USEABLE STORAGE THIS YEAR	USEABLE STORAGE LAST YEAR	USEABLE STORAGE AVE.	WATERSHED	NO. COURSES AVG'D	THIS YEAR AS % OF LAST YR. AVERAGE
FLAMING GORGE	3749.0	3257.0	3117.0	---	UPPER GREEN RIVER in UTAH	9	67 80
MOON LAKE	35.8	25.6	17.6	13.6	ASHLEY CREEK	2	34 42
RED FLEET	26.0	17.1	19.0	---	BLACK'S FORK RIVER	3	75 90
STEINAKER	33.3	32.2	29.0	18.2	SHEEP CREEK	2	90 105
STARVATION	165.3	149.8	149.0	105.2	DUCHESNE RIVER	11	30 49
STRAWBERRY-ENLARGED	951.4	529.1	506.0	---	LAKE FORK-YELLOWSTONE CRE	3	47 76
					STRAWBERRY RIVER	4	16 25
					UINTAH-WHITEROCKS RIVERS	3	40 68
					UINTAH BASIN & DAGGET SCD	21	44 64


1 - Reas. max. and reas. min. forecasts are for 5% and 95% exceedance levels and also (2) below.  
2 - Corrected for upstream diversions or changes in reservoir storage.  
The average is computed for the 1961-85 base period.

# Carbon, Emery, Wayne, Grand, and San Juan Co.

Mountain snowpack\* (inches)



\*Based on selected stations

Maximum  Average   
Minimum  Current 

## WATER SUPPLY OUTLOOK:

Snowpack on the watersheds of Southeastern Utah is below average. Price River snow courses have only 22% of average January 1 water content. The La Sal Mountains are 83% of average. Forecasts of spring and summer streamflow range from 67% of average on Muddy Creek near Emery to 130% for the Colorado River near Cisco. Reservoir storage is 77% of capacity and 139% of average.

For more information contact your local Soil  
Conservation Service office:  
Price Field Office 801-637-0041

**CARBON, EMERY, WAYNE, GRAND, & SAN JUAN Co.**

**STREAMFLOW FORECASTS**

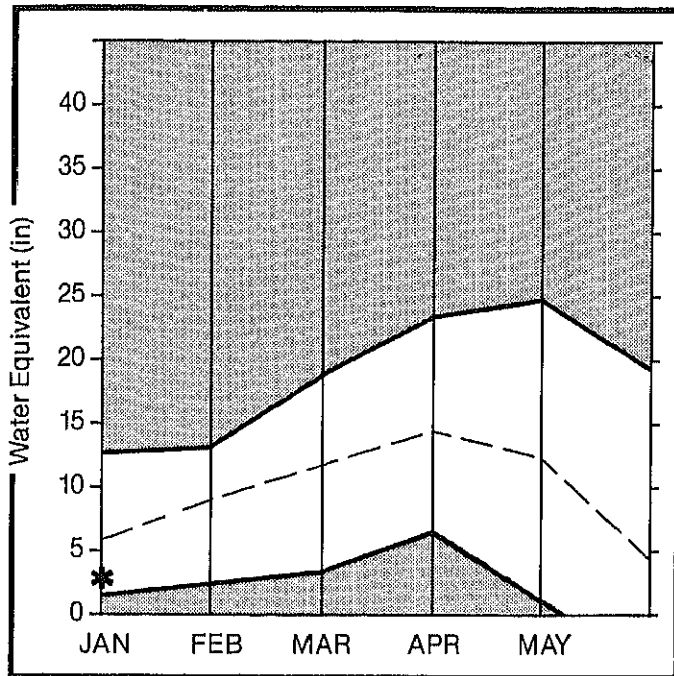
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GOOSEBERRY CREEK near Scofield	APR-JUL	10.7	8.7	81	14.0	131	4.0	37
SCOFIELD RESERVOIR inflow	APR-JUL	46.0	32.0	70	51.0	111	16.0	35
PRICE near Heiner	APR-JUL	63.0	56.0	89				
HUNTINGTON CREEK near Huntington	APR-JUL	55.0	40.0	73	65.0	118	21.0	38
COTTONWOOD CREEK near Orangeville	APR-JUL	47.0	35.0	74	53.0	113	17.0	36
FERRON CREEK near Ferron	APR-JUL	41.0	30.0	73	48.0	117	12.0	29
MUDDY CREEK near Emery	APR-JUL	21.0	14.0	67	27.0	129	3.0	14
COLORADO near Cisco, UT	APR-JUL	3443.0	4475.0	130	6470.0	188	2890.0	84
GREEN near Green Rv., UT	APR-JUL	3176.0	3300.0	104	4440.0	140	2090.0	66
MILL CREEK near Moab	APR-JUL	5.5	5.0	91	8.0	145	2.0	36
NAVAJO RESERVOIR inflow	APR-JUL	764.0	775.0	106	1210.0	158	440.0	58
SAN JUAN near Bluff, UT	APR-JUL	1091.0	1200.0	110	1940.0	178	630.0	58
SEVEN MILE CREEK near Fish Lake	APR-JUL	6.5	5.6	86	10.0	154	2.0	31

RESERVOIR STORAGE (1000AF)					WATERSHED SNOWPACK ANALYSIS			
RESERVOIR	USEABLE CAPACITY	USEABLE STORAGE THIS YEAR	USEABLE STORAGE LAST YEAR	USEABLE STORAGE AVG.	WATERSHED	NO. COURSES AVG'D	THIS YEAR AS % OF LAST YR.	% OF AVERAGE
HUNTINGTON NORTH	3.9	3.2	2.5	2.0	PRICE RIVER	3	17	22
JOE'S VALLEY	54.6	46.2	48.4	42.7	SAN RAFAEL RIVER	7	28	36
KEN'S LAKE	2.3	0.7	0.9	---	MUDDY RIVER	2	23	30
MILL SITE	16.7	10.6	7.3	3.0	FREMONT RIVER	4	55	73
SCOFIELD	65.8	48.8	45.0	30.3	LASAL MOUNTAINS	2	64	83
					BLUE MOUNTAINS	2	42	53
					CARBON, EMERY, WAYNE, GRA	21	38	49

1 - Reas. max, and reas. min. forecasts are for 5% and 95% exceedance levels and also (2) below.  
 2 - Corrected for upstream diversions or changes in reservoir storage.  
 The average is computed for the 1961-85 base period.

# Sevier & Beaver River Basins

## Mountain snowpack\* (inches)



\*Based on selected stations

Maximum  Average   
Minimum  Current 

## WATER SUPPLY OUTLOOK:

Snowpack on the Sevier is about half of normal for January 1. Water content on the Upper Sevier is 53%, East Fork 57%, South Fork 50% and Lower Sevier 44%. The Beaver River has 57% of average January 1 water equivalent in the snowpack. Streamflow forecasts of spring and summer flows range widely from 60% of average for Oak Creek near Oak City to 182% for the Sigurd to Gunnison reach of the Sevier. Reservoir storage is very good with current storage at 88% of capacity and 226% of average for January 1.

For more information contact your local Soil  
Conservation Service office:  
Richfield Field Office 801-896-6261  
Fillmore Field Office 801-743-6655



# SEVIER & BEAVER RIVER BASINS

## STREAMFLOW FORECASTS

FORECAST POINT	FORECAST PERIOD	25 YR. AVG. (1000AF)	MOST PROBABLE (1000AF)	MOST PROBABLE (% AVG.)	REAS. MAX. (1000AF)	REAS. MAX. (% AVG.)	REAS. MIN. (1000AF)	REAS. MIN. (% AVG.)
SEVIER at Hatch	APR-JUL	52.0	49.0	94	79.0	152	27.0	52
SEVIER near Circleville	APR-JUL	44.0	42.0	95				
SEVIER near Kingston	APR-JUL	34.0	27.0	79	67.0	197	7.0	21
ANTIMONY CREEK near Antimony	APR-JUL	7.4	6.9	93				
E F SEVIER near Kingston	APR-JUL	24.0	21.0	88	46.0	192	10.0	42
SEVIER b/w Piute Dam	APR-JUL	56.0	42.0	75	103.0	184	10.0	18
CLEAR CREEK near Sevier	APR-JUL	22.0	16.0	73				
SIGURD to GUNNISON	APR-JUL	44.0	80.0	182	128.0	291	36.0	82
KINGSTON to VERMILLION DAM	APR-JUL	33.0	48.0	145				
VERMILLION DAM to GUNNISON	MAR-JUL	54.0	92.0	170				
SALINA CREEK at Salina	APR-JUN	10.7	9.5	89				
SEVIER nr Gunnison	APR-JUL	99.0	110.0	111				
CHALK CREEK near Fillmore	APR-JUL	16.4	10.8	66	21.0	128	2.0	12
CHICKEN CREEK near Levan	APR-JUL	3.5	2.3	66	4.0	114	1.0	29
OAK CREEK near Oak City	APR-JUL	1.6	0.9	60	3.0	188	0.4	25
EPHRAIM CREEK near Ephraim	APR-JUL	14.9	13.7	92				
PLEASANT CREEK near Pleasant	APR-JUL	8.6	6.6	77				
SALT CREEK near Nephi	APR-JUL	13.5	8.8	65	22.0	163	2.0	15
BEAVER RIVER near Beaver	APR-JUL	27.0	22.0	81	42.0	156	7.0	26
NORTH CREEK near Beaver (combined N	APR-JUL	14.6	12.0	82	26.0	178	2.0	14
MINERSVILLE RESERVOIR inflow	APR-JUN	8.9	8.0	90	15.0	169	1.0	11

## RESERVOIR STORAGE

(1000AF)

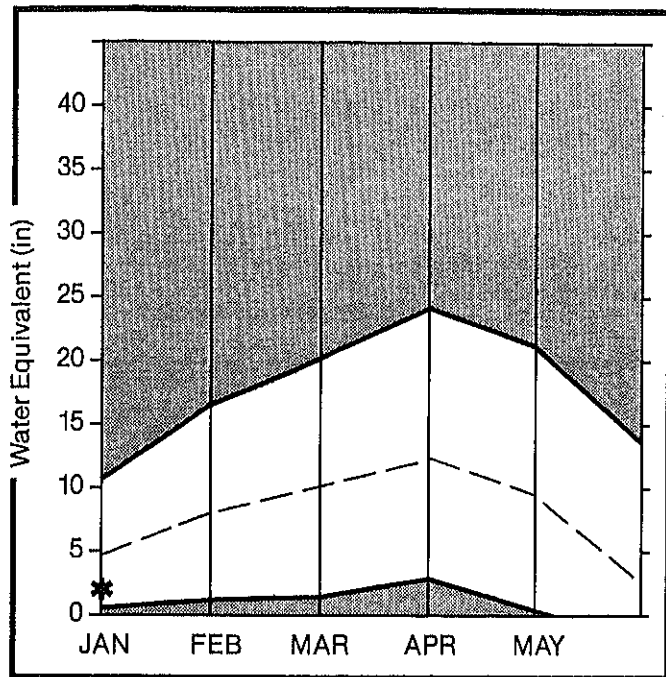
## WATERSHED SNOWPACK ANALYSIS

RESERVOIR	USEABLE CAPACITY	** USEABLE STORAGE **			WATERSHED	NO. COURSES AVG'D	THIS YEAR AS % OF	
		THIS YEAR	LAST YEAR	AVG.			LAST YR.	AVERAGE
GUNNISON	20.3	16.8	16.8	9.8	UPPER SEVIER RIVER (south	11	44	53
MINERSVILLE (RkyFd)	26.0	17.5	15.1	9.3	EAST FORK SEVIER RIVER	4	47	57
OTTER CREEK	52.6	49.9	50.2	28.8	SOUTH FORK SEVIER RIVER	7	43	50
PIUTE	71.8	60.1	46.5	29.3	LOWER SEVIER RIVER (inclu	12	35	44
SEVIER BRIDGE	236.0	214.1	208.1	87.0	BEAVER RIVER	3	29	57
PANQUITCH LAKE	22.3	17.2	18.7	---	SEVIER & BEAVER RIVER BAS	26	37	48





1 - Reas. max. and reas. min. forecasts are for 5% and 95% exceedance levels and also (2) below.  
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 The average is computed for the 1961-85 base period.

## E. Garfield, Kane, Washington, & Iron Co.

Mountain snowpack\* (inches)



\*Based on selected stations

Maximum		Average	
Minimum		Current	

### WATER SUPPLY OUTLOOK:

Snowpack on the watersheds of Southwestern Utah is much below average with the exception of the Escalante River which is 154% of the January 1 norm. Virgin River snowpack is 31% of average and Coal Creek is 36% of average. Streamflow forecasts range from 73% on Coal Creek to 117% for inflow to Lake Powell. The Virgin and Santa Clara Rivers are forecast at 82% and 79% of average respectively. Reservoir storage is only 32% of capacity in the four reservoirs for which data are available.

For more information contact your local Soil  
Conservation Service office:  
Cedar City Field Office 801-586-2429

**E. GARFIELD, KANE, WASHINGTON, & IRON Co.**

**STREAMFLOW FORECASTS**

FORECAST POINT	FORECAST PERIOD	25 YR. AVG. (1000AF)	MOST PROBABLE (1000AF)	MOST PROBABLE (% AVG.)	REAS. MAX. (1000AF)	REAS. MAX. (% AVG.)	REAS. MIN. (1000AF)	REAS. MIN. (% AVG.)
VIRGIN near Hurricane	APR-JUN	68.0	56.0	82	92.0	135	18.0	26
SANTA CLARA near Pine Valley	APR-JUN	5.3	4.2	79				
COAL CREEK near Cedar City	APR-JUL	20.0	14.5	73	24.0	120	8.0	40
LAKE POWELL inflow	APR-JUL	8086.0	9500.0	117	13543.0	167	6023.0	74

RESERVOIR STORAGE (1000AF)					WATERSHED SNOWPACK ANALYSIS		
RESERVOIR	USEABLE CAPACITY	XX USEABLE STORAGE XX	THIS YEAR	LAST YEAR	WATERSHED	NO. COURSES AVG'D	THIS YEAR AS % OF LAST YR. AVERAGE
GUNLOCK	10.4	4.3	---	---	VIRGIN RIVER	5	28 31
LAKE POWELL	25002.0	22544.0	22993.0	---	PARDHAN	4	38 44
QUAIL CREEK	40.0	13.0	---	---	ENTERPRISE TO NEW HARMONY	2	45 58
UPPER ENTERPRISE	10.0	2.5	---	---	COAL CREEK	3	35 36
LOWER ENTERPRISE	2.6	0.5	---	---	ESCALANTE RIVER	2	130 154
					E. GARFIELD, KANE, WASHIN	12	39 43

1 - Reas. max. and reas. min. forecasts are for 5% and 95% exceedance levels and also (2) below.  
 2 - Corrected for upstream diversions or changes in reservoir storage.  
 The average is computed for the 1961-85 base period.



# SNOW DATA MEASUREMENTS

SNOW COURSE	ELEV.	DATE	SNOW DEPTH	WATER CONTENT	LAST YEAR	AVERAGE 1961-85
ASHLEY TWIN LAKES	10500	no data			-	7.5
ATWOOD LAKE	10500	no data			9.5	5.5
BEAVER CREEK DIVIDE	8280	12/29	9	1.8	7.2	5.7
BEAVER DAMS	8000	12/28	6	1.1	6.3	4.8
BEN LOMOND PEAK	8000	12/29	25	7.7	20.3	14.7
BEN LOMOND TRAIL	6000	12/30	10	2.5	13.9	7.1
BEVAN'S CABIN	6450	12/31	13	3.9	4.8	2.6
BIG FLAT	10290	12/26	24	6.2	15.0	7.0
BIRCH CROSSING	8100	12/23	5	1.1	3.7	3.3
BLACK'S FLAT-U.M. CK	9400	12/27	11	2.6	6.5	5.0
BLACK'S FORK	9200	12/27	-	2.3E	7.9	6.1
BLACK'S FORK GS-EF	9340	12/29	11	2.0	4.2	3.7
BLACK'S FORK JUNCTN	8930	12/29	14	3.1	4.5	3.9
BOX CREEK	9300	12/27	9	2.0	6.8	5.6
BRIAN HEAD	10000	12/26	28	7.7	11.2	9.1
BROWN DUCK RIDGE	10600	12/29	32	8.6	13.5	8.6
BRYCE CANYON	8000	12/29	7	1.0	2.5	2.1
BUCK FLAT	9800	12/30	12	2.5	10.0	7.1
BUCK PASTURE	9700	no data			-	9.0
BUCKBOARD FLAT	9000	12/30	13	3.6	8.0	6.5
BUG LAKE	7950	12/29	19	4.8	10.3	8.3
BURT'S-MILLER RANCH	7900	12/29	8	2.0	3.6	2.4
CAMP JACKSON	8600	12/30	14	3.4	8.6	6.7
CASTLE VALLEY	9580	12/26	11	2.2	6.1	6.1
CHALK CREEK #1	9100	12/29	29	8.8	15.7	10.0
CHALK CREEK #2	8200	12/29	20	4.9	9.1	6.5
CHALK CREEK #3	7500	12/29	10	2.4	4.6	3.6
CHEPETA	10300	12/30	19	4.5	10.1	5.3
CHEPETA-WHITERKS. LK	10350	no data			-	6.6
CLEAR CREEK MEADOWS	9420	01/01	-	3.8E	-	9.5
CLEAR CREEK RIDGE #1	9200	12/28	12	2.6	8.7	8.1
CLEAR CREEK RIDGE #2	8000	12/28	10	2.2	6.5	6.6
CLEAR CREEK RIDGE #3	6600	12/28	4	.7	4.1	3.8
CURRENT CREEK	8000	12/28	1	.1	7.7	4.5
DANIELS-STRAWBERRY	8000	12/28	4	.7	10.8	6.2
DESERET PEAK	9250	12/30	13	3.6	-	12.2
DILL'S CAMP	9200	12/27	5	1.1	7.2	5.2
DONKEY RESERVOIR	9800	12/27	28	7.1	3.9	3.3
DRY BREAD POND	8350	12/29	11	2.6	7.8	8.5
DUCK CREEK R.S.	8700	12/27	-	2.4E	5.9	5.5
EAST SHINGLE LAKE	9800	no data			-	13.3
FARMINGTON CANYON	8000	12/29	21	6.4	16.7	13.7
FARMINGTON CANYON L.	6950	12/29	17	4.4	12.4	10.4
FARNSWORTH LAKE	9600	12/27	26	7.4	8.9	8.3
FISH LAKE	8700	12/27	4	.9	5.2	3.9
FIVE POINT LAKE	11000	no data			8.4	7.0
G.B.R.C. HEADQUARTER	8700	12/27	12	2.7	10.2	7.3
G.B.R.C. MEADOWS	10000	12/28	22	5.9	12.7	9.9
GARDEN CITY SUMMIT	7600	12/29	9	1.9	9.8	7.6
GEORGE CREEK	8840	no data			-	-
GEORGE PEAK	9000	no data			-	-
GOOSEBERRY R.S.	8000	12/27	14	3.2	6.7	12.5
HARDSCRABBLE	6700	12/29	10	1.4	12.5	5.3
HARRIS FLAT	7700	12/27	5	.6	3.8	9.3
HAYDEN FORK	9400	12/29	16	3.8	7.1	3.4
HENRY'S FORK	10000	no data			-	6.2
HEWINTA G.S.	9500	12/29	15	3.3	4.2	6.5
HOLE-IN-THE-ROCK	9150	12/30	10	1.8	3.4	3.8
HOLE-IN-THE-ROCK GS	8300	no data			-	2.8
HICKERSON PARK	9100	12/30	14	2.9	3.4	1.0
HOBBLE CREEK SUMMIT	7420	12/28	7	1.8	8.5	3.8
HORSE RIDGE	8260	12/29	15	3.6	10.3	6.9
HUNTINGTON-HORSESHOE	9800	12/28	19	5.9	13.8	9.0
INDIAN CANYON	9100	12/28	13	3.1	7.9	10.2
JOHNSON VALLEY	8850	12/27	3	.7	4.9	5.6
						3.3

# SNOW DATA MEASUREMENTS (cont.)

SNOW COURSE	ELEV.	DATE	SNOW DEPTH	WATER CONTENT	LAST YEAR	AVERAGE 1961-85
KILFOIL CREEK	7300	12/29	12	2.5	7.3	6.0
KIMBERLY MINE (UPPER)	9300	12/26	22	5.7	9.3	6.5
KING'S CABIN (UPPER)	8730	12/30	9	1.8	5.4	4.5
KLONDIKE NARROWS	7400	12/29	11	2.8	9.5	8.2
KOLOB-CRYSTAL	9250	12/27	9	1.4	9.6	8.5
LAKEFORK BASIN	11100	no data			10.3	9.3
LAKEFORK MOUNTAIN #1	10200	12/29	15	3.9	8.8	5.2
LAKEFORK MOUNTAIN #3	8400	12/29	2	.3	4.8	3.1
LAMBS CANYON	7400	12/29	18	4.3	9.4	7.3
LASAL MOUNTAIN LOWER	8800	12/31	13	2.6	6.6	4.5
LASAL MOUNTAIN (UPP)	9850	12/31	29	7.5	9.2	7.6
LIGHTNING LAKE	10500	no data			15.3	10.2
LILY LAKE	9050	12/30	22	5.2	9.1	6.5
LITTLE BEAR (LOWER)	6000	12/29	6	1.2	7.6	4.7
LITTLE BEAR (UPPER)	6550	12/29	8	1.6	9.1	5.5
LITTLE GRASSY CREEK	6100	12/26	1	.3	0.4	1.0
LONG FLAT	8000	12/26	9	1.5	3.6	2.1
LONG VALLEY JCT.	7500	12/27	8	.2	3.8	2.3
LOST CREEK RESERVOIR	6130	12/29	0	0.0	3.5	2.3
MAMMOTH-COTTONWOOD	8800	12/28	13	3.0	14.3	9.0
MERCHANT VALLEY (UP)	8750	12/26	6	1.0	9.6	5.3
MIDDLE BEAVER CREEK	8650	no data			-	1.8
MIDDLE CANYON	7000	12/31	18	4.8	6.7	6.1
MIDWAY VALLEY	9800	12/27	19	6.2	9.0	9.0
MILL CREEK	6950	01/06	40	7.6	9.7	9.8
MILL D SOUTH FORK	7400	12/30	17	4.3	8.6	8.6
MONTE CRISTO R.S.	8960	12/29	20	4.6	11.2	9.6
MOSBY MOUNTAIN (LOW)	9500	12/30	11	2.1	7.3	4.5
MT. BALDY R.S.	9500	12/28	22	6.1	13.7	10.0
MUD CREEK #2	8600	12/28	8	1.4	7.5	6.0
OAK CREEK	7760	12/26	7	1.1	7.2	6.1
ONE MILE SUMMIT	7330	no data			-	1.5
OTTER LAKE	9600	12/26	12	2.8	9.9	5.2
PANQUITCH LAKE	8200	12/26	2	.4	3.6	2.4
PARADISE PARK	10100	12/30	16	4.2	9.8	6.2
PARLEY'S CANYON SUM.	7500	12/29	17	4.4	9.3	8.3
PAYSON R.S.	8050	12/26	15	3.2	8.9	8.3
PICKLE KEG SPRING	9600	12/27	11	2.2	7.8	7.0
PINE CANYON	8000	12/29	13	3.1	9.8	8.0
PINE CREEK	8800	12/26	12	2.6	9.9	7.7
REDDEN MINE LOWER	8500	12/29	14	3.0	10.9	8.6
RED PINE RIDGE	9200	12/28	12	2.7	8.1	7.0
REES'S FLAT	7300	12/26	10	2.2	7.6	6.6
REYNOLDS PARK	10400	no data			-	7.7
ROCK CREEK	7900	12/29	1	.2	6.6	3.6
ROCKY BASIN-SETTLEMT	8900	12/31	24	7.4	11.3	13.7
SEELEY CREEK R.S.	10000	12/28	9	2.1	9.8	7.1
SERGEANT LAKES	8300	no data			-	-
SHINGLE MILL	6200	12/23	3	.4	3.7	4.0
SILVER LAKE (BRIGHT.)	8730	12/30	20	5.2	12.9	10.9
SMITH & MOREHOUSE	7600	12/29	12	3.2	7.6	5.6
SNOWBIRD GAD VALLEY	9700	no data			-	19.5
SOAPSTONE R.S.	7800	12/29	-	2.2E	6.7	5.5
SPIRIT LAKE	10300	12/30	26	7.0	7.6	5.6
SQUAW SPRINGS	9300	12/27	4	.6	4.8	3.9
STEEL CREEK PARK	10100	12/29	32	8.7	9.7	7.7
STILLWATER CAMP	8550	12/30	12	2.8	5.5	4.4
STRAWBERRY DIVIDE	8400	12/30	11	2.3	12.1	8.5
STUART R.S.	7950	12/28	2	.5	4.1	4.1
SUSC RANCH	8200	12/23	1	.1	5.0	3.6
TALL POLES	8800	12/23	17	3.5	6.5	6.2
THAYNES CANYON	9200	12/24	21	5.0	-	-
THISTLE FLAT	8500	no data			-	6.8
TIMPANOGOS DIVIDE	8140	12/28	12	2.8	14.0	10.3

## SNOW DATA MEASUREMENTS (cont.)

SNOW COURSE	ELEV.	DATE	SNOW DEPTH	WATER CONTENT	LAST YEAR	AVERAGE 1961-85
TONY GROVE LAKE	8400	12/29	22	6.1	17.5	16.2
TONY GROVE R.S.	6250	12/29	8	1.8	6.6	5.1
TRIAL LAKE	9960	12/29	25	6.5	15.8	11.0
TROUT CREEK	9400	12/30	11	2.2	6.2	5.0
UPPER JOES VALLEY	8900	12/28	5	.7	5.3	4.4
VERNON CREEK	7500	12/31	1	.1	6.2	4.7
VIFONT	7670	no data			-	6.2
WEBSTER FLAT	9200	12/27	5	.8	6.5	6.9
WHITE RIVER #1	8550	12/28	10	2.0	8.1	6.1
WHITE RIVER #3	7400	12/28	1	.1	4.9	3.9
WIDTSOE-ESCALANTE #3	9500	12/27	23	6.0	6.2	5.2
WRIGLEY CREEK	9000	12/27	9	1.6	6.6	4.4
YANKEE RESERVOIR	8700	12/26	12	2.5	4.0	4.4







# The Following Organizations Cooperate With The Soil Conservation Service In Snow Survey Work

## State

Utah State University  
Utah State Department of Natural Resources  
Division of Wildlife Resources  
Division of Water Resources  
Division of Water Rights  
Bear River Commissioner  
Price River Commissioner  
Provo River Commissioner  
Sevier River Commissioners  
Spanish Fork River Commissioner  
Utah Lake and Jordan River Commissioner

## Federal

U.S. Department of Agriculture  
Soil Conservation Service  
Forest Service  
U.S. Department of Commerce  
NOAA, National Weather Service  
U.S. Department of Interior  
Bureau of Reclamation  
Geological Survey  
National Park Service

## Municipality

Manti  
Salt Lake City

## Public

Beaver River Water Users Association  
Board of Canal Presidents - Jordan River  
Central Utah Conservancy District  
Emery Canal and Reservoir Company  
Moon Lake Water Users Association  
Ogden River Water Users Association  
Provo River Water Users Association  
Strawberry Water Users Association  
Sevier River Water Users Association  
Weber River Water Users Association  
Weber Basin Conservancy District

Other organizations and individuals furnish  
information for the snow survey reports.  
Their cooperation is gratefully acknowledged.

All programs and services of U.S. Dept.  
of Agriculture are available to everyone  
without regard to race, creed, color, sex,  
age, handicap, or national origin.